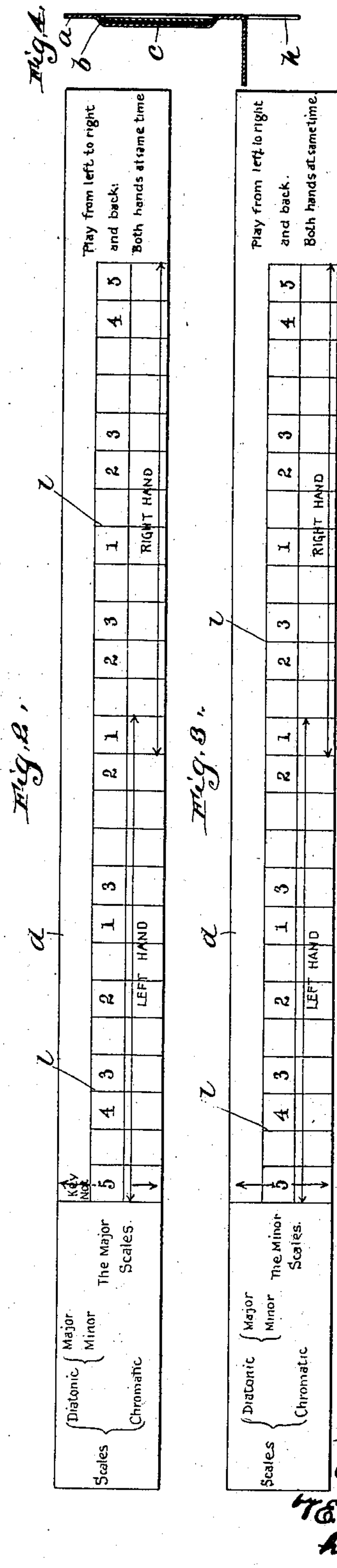
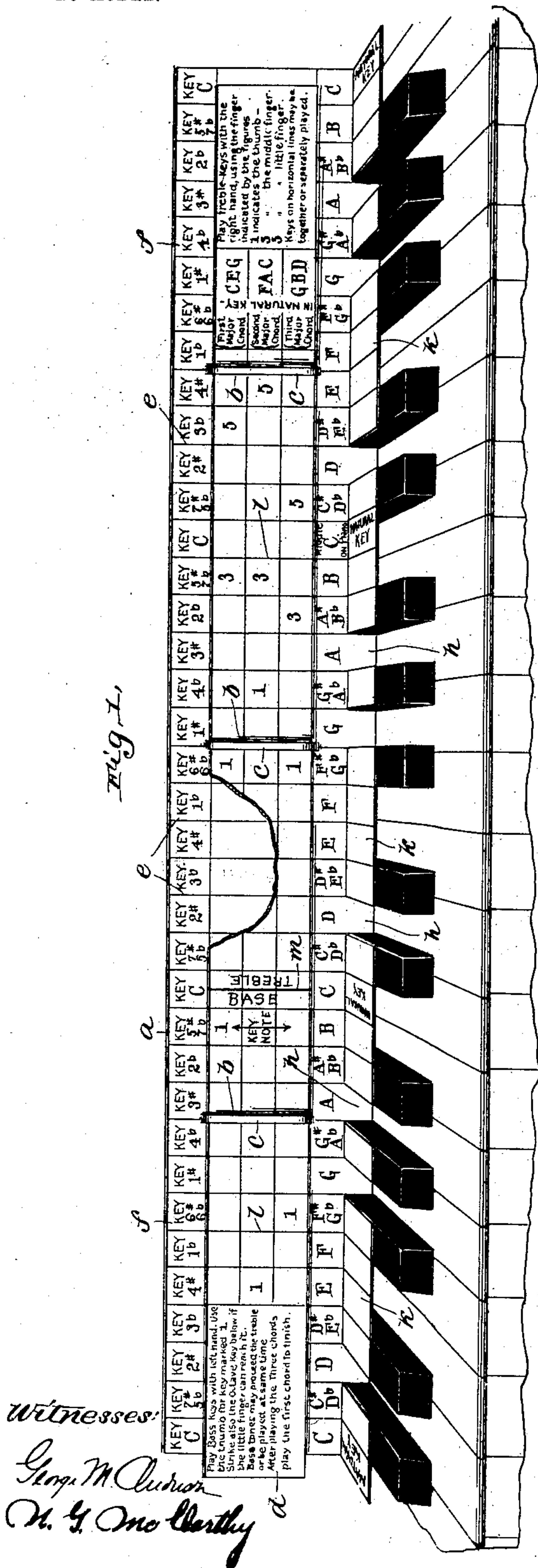


E. W. CURTISS.  
HARMONY AND TRANSPOSITION CHART.

APPLICATION FILED AUG. 9, 1902.

NO MODEL.





# UNITED STATES PATENT OFFICE.

EDWARD W. CURTISS, OF SHEFFIELD, MASSACHUSETTS.

## HARMONY AND TRANSPOSITION CHART.

SPECIFICATION forming part of Letters Patent No. 741,017, dated October 13, 1903.

Application filed August 9, 1902. Serial No. 118,994. (No model.)

*To all whom it may concern:*

Be it known that I, EDWARD W. CURTISS, a citizen of the United States, and a resident of Sheffield, in the county of Berkshire and State of Massachusetts, have made a certain new and useful invention in Harmony-Charts and Transposing-Charts in Music; and I declare the following to be a full, clear, and exact description of the same, such as will enable others skilled in the art to which it appertains to make and use the invention, reference being had to the accompanying drawings, and to characters of reference marked thereon, which form a part of this specification.

Figure 1 is a perspective view of my invention as applied. Figs. 2 and 3 illustrate different transposition strips or slides. Fig. 4 is a cross-section of my chart.

The invention relates to means for teaching the rudiments of harmony and music; and it consists in the novel construction and combinations of parts constituting the chart-form, key pointer or guide for use in connection with a piano or organ, as hereinafter set forth. This musical guide or key indicator is designed to be placed upon the keyboard of a piano or organ in such wise that it points out which of the keys if struck will produce sounds in harmony, thus teaching the rudiments of music by the musical tones or sounds of the instrument, so that a musically-inclined person can readily learn to play the piano or organ by sound or "by ear" without first learning the notes and signs as usually written upon the musical staves. The guide also points out the key and changes in the fingering necessary to produce the musical chords in the different keys in music. The guide device also shows how any harmonic succession or combination of sounds may be transposed from one key in music to any other key. As the guide device is designed to point out directly the keys themselves of the organ or piano, it may be regarded as an attachment to such instrument, although it usually rests on the keyboard instead of being actually secured to the front.

The guide is designed to be made of cardboard, celluloid, or other thin and sufficiently stiff material and consists of a body portion *a*, which is about twenty inches long,

more or less, and about three inches wide. At different points slits *b b* are cut in order to provide holder-bars *c c* for the change or transposition slides *d*, or the bars *c c* may be attached to the body portion.

The guide is provided with vertical lines *e*, which subdivide its length into sections of the width of the keys of the instrument, and along the top portion of the chart the series of subdivisions is marked with the different keys in music arranged in the order shown, as at *f*. Along the bottom of the guide the series of subdivisions may be colored black or white to correspond with the color of the piano-key and marked with the names of the keys on the keyboard of a piano or organ, arranged in proper order, as they are upon such keyboard. When, therefore, the guide is placed on the keyboard in proper position, the name of each key will be in position just above the key, so that the guide points out the key to the finger. The guide also points out the relation of the instrument-keys to the keys in music in a similarly direct manner, showing the key "one sharp" is in the same subdivision of the guide as "G," &c.

The lower edge of the chart-guide is provided with downwardly-extending projections *h*, designed to fit in between the "black" keys and so arranged that when the subdivision marked "middle C on piano" is just over or above the key on the piano or organ named "middle C" the chart-guide will be in proper position upon the keyboard. The extensions or projections serve to fix the position and to more readily point out the keys from the guide. Instead of cutting the material away between these projections *h* such material is usually bent forward, or a flange *k* is made at right angles to the plane of the guide, serving to rest on the black keys, and thereby to assist in holding the chart-guide in an upright position and against the face or "front" of the piano or organ.

The transposition strips or slides *d* are also subdivided by means of vertical lines *l* into sections, as shown, such sections being of the same width as the subdivisions of the body of the chart-guide. Each strip *d* is designed to fit in its slideway so that while it is held sufficiently firm in position it can be readily moved endwise for proper adjustment or can



be removed from the chart-guide entirely to allow another slide to be put in its place. These slides *d* are preferably made of the same material as the chart-guide. The slide  
 5 may also be subdivided by means of longitudinal lines into sections for the different chords, which should be marked thereon, as the "First major chord," "Second major chord," "Third major chord," &c. On the  
 10 slip is also marked an arrow or pointer device *l* to indicate by pointing to the proper key of the main chart when the slip is in position. A line *m* on said slip may also be used to divide the treble from the bass. On  
 15 the proper subdivisions are marked figures or signs to indicate the keys to be struck, such figures also being properly numbered to show the proper fingers to be used in striking such keys. For instance, if the indicator  
 20 *l* points to the key of "C," or the natural key, and the slip shows the succession of keys which if struck will produce the tones of the major diatonic scale in the key of "C" there is no difficulty in its use by an unskilled per-  
 25 former to produce such tones. Now if the strip is moved along the chart until the indicator points to the key of "G," or one sharp, the marked sections will now indicate which keys are to be struck and by which fingers to  
 30 produce the tones of the scale in this key. In like manner the strip or various strips may be marked for other transpositions—such, for instance, as the major chords, the minor chords, the chromatic scale, &c.—as

also strips may be marked to show how to 35 modulate from one key to another key, how to perform finger exercises, &c. Such slips or strips should be marked with proper directions and designations of their purpose.

Having described this invention, what I 40 claim, and desire to secure by Letters Patent, is—

In a chart-form guide for piano or organ, the combination with the main portion thereof, having the downwardly-extending pro- 45 jections adapted to fit in between the black keys, and the outwardly-extending projections between said downward projections and adapted to rest upon the black keys of the keyboard, the top series of horizontal subdivi- 50 sions marked with the names of the keys in music, and the bottom series of horizontal subdivisions marked with the names of the keys on the keyboard, and between said top and bottom series the vertical holding-bars, of the 55 removable transposition slips or slides having vertical series of subdivisions for designations of the notes to be played, and adapted to be alined with said horizontal subdivisions containing the names of the keys in 60 music, and on the keyboard, substantially as specified.

In testimony whereof I affix my signature in presence of two witnesses.

EDWARD W. CURTISS.

Witnesses:

F. N. DELAND,  
 C. H. BOOTH.